# General

## Guideline Title

Screening and behavioral counseling interventions in primary care to reduce alcohol misuse: U.S. Preventive Services Task Force recommendation statement.

## Bibliographic Source(s)

U.S. Preventive Services Task Force (USPSTF). Screening and behavioral counseling interventions in primary care to reduce alcohol misuse: U.S. Preventive Services Task Force recommendation statement. Ann Intern Med. 2013 Aug 6;159(3):210-8. [35 references] PubMed

## Guideline Status

This is the current release of the guideline.

This guideline updates a previous version: Screening and behavioral counseling interventions in primary care to reduce alcohol misuse: recommendation statement. Ann Intern Med. 2004 Apr 6;140(7):554-6.

# Recommendations

## Major Recommendations

The U.S. Preventive Services Task Force (USPSTF) grades its recommendations (A, B, C, D, or I) and identifies the levels of certainty regarding net benefit (High, Moderate, and Low). The definitions of these grades can be found at the end of the "Major Recommendations" field.

Summary of Recommendations and Evidence

The USPSTF recommends that clinicians screen adults aged 18 years or older for alcohol misuse and provide persons engaged in risky or hazardous drinking with brief behavioral counseling interventions to reduce alcohol misuse. (B recommendation)

The USPSTF concludes that the current evidence is insufficient to assess the balance of benefits and harms of screening and behavioral counseling interventions in primary care settings to reduce alcohol misuse in adolescents. (I statement)

Clinical Considerations

Patient Population Under Consideration

The B recommendation applies to adults aged 18 year or older, and the I statement applies to adolescents aged 12 to 17 years. Although pregnant women are included, this recommendation is related to decreasing risky or hazardous drinking, not to complete abstinence, which is recommended for all pregnant women. These recommendations do not apply to persons who are actively seeking evaluation or treatment for alcohol misuse.

Screening Tests

The USPSTF considers 3 tools as the instruments of choice for screening for alcohol misuse in the primary care setting: the Alcohol Use Disorders Identification Test (AUDIT), the abbreviated AUDIT-Consumption (AUDIT-C), and single-question screening (for example, the National Institute on Alcohol Abuse and Alcoholism [NIAAA] recommends asking, "How many times in the past year have you had 5 [for men] or 4 [for women and all adults older than 65 years] or more drinks in a day?").

Of available screening tools, AUDIT is the most widely studied for detecting alcohol misuse in primary care settings; both AUDIT and the abbreviated AUDIT-C have good sensitivity and specificity for detecting the full spectrum of alcohol misuse across multiple populations. The AUDIT comprises 10 questions and requires approximately 2 to 5 minutes to administer; AUDIT-C comprises 3 questions and takes 1 to 2 minutes to complete. Single-question screening also has adequate sensitivity and specificity across the alcohol-misuse spectrum and requires less than 1 minute to administer.

Behavioral Counseling Interventions

Behavioral counseling interventions for alcohol misuse vary in their specific components, administration, length, and number of interactions. They may include cognitive behavioral strategies, such as action plans, drinking diaries, stress management, or problem solving. Interventions may be delivered by face-to-face sessions, written self-help materials, computer- or Web-based programs, or telephone counseling. For the purposes of this recommendation statement, the USPSTF uses the following definitions of intervention intensity: very brief single-contact (≤5 minutes), brief single-contact (6 to 15 minutes), brief multicontact (each contact is 6 to 15 minutes), and extended multicontact (≥1 contact, each >15 minutes). Brief multicontact behavioral counseling seems to have the best evidence of effectiveness; very brief behavioral counseling has limited effect.

The USPSTF found that counseling interventions in the primary care setting can positively affect unhealthy drinking behaviors in adults engaging in risky or hazardous drinking. Positive outcomes include reducing weekly alcohol consumption and long-term adherence to recommended drinking limits. Because brief behavioral counseling interventions decrease the proportion of persons who engage in episodes of heavy drinking (which results in high blood alcohol concentration [BAC]), indirect evidence supports the effect of screening and brief behavioral counseling interventions on important health outcomes, such as the probability of traumatic injury or death, especially that related to motor vehicles.

Although screening detects persons along the entire spectrum of alcohol misuse, trials of behavioral counseling interventions in primary care settings largely focused on risky or hazardous drinking rather than alcohol abuse or dependence. Limited evidence suggests that brief behavioral counseling interventions are generally ineffective as singular treatments for alcohol abuse or dependence. The USPSTF did not formally evaluate other interventions (such as pharmacotherapy or outpatient treatment programs) for alcohol abuse or dependence, but the benefits of specialty treatment are well-established and recommended for persons meeting the diagnostic criteria for alcohol dependence.

Screening Intervals

Evidence is lacking to determine the optimal interval for screening for alcohol misuse in adults.

Suggestions for Practice Regarding the I Statement

In deciding whether to screen adolescents for alcohol misuse and provide behavioral counseling interventions, primary care providers should consider the following factors.

*Potential Preventable Burden*

In 2010, approximately 14% of adolescents in the 8th grade and 41% in the 12th grade reported using alcohol at least once within the past 30 days; 7% and 23%, respectively, reported consuming at least 5 or more drinks on a single occasion (an episode of heavy use) within the previous 2 weeks. Motor vehicle crashes are the leading cause of death for adolescents; according to the Substance Abuse and Mental Health Services Administration, about 4% of 16-year-olds and 9% of 17-year-olds in 2009 drove under the influence of alcohol at least once during the previous year. Thirty-seven percent of traffic deaths among youth aged 16 to 20 years involve alcohol, and these deaths frequently involve alcohol-impaired drivers with lower BACs than other age groups.

*Costs*

Behavioral counseling interventions are associated with a time commitment ranging from 5 minutes to 2 hours, spread over multiple contacts. There are potential financial costs for parents and caregivers from lost work hours and travel to and from the provider.

*Potential Harms*

Potential harms associated with screening for alcohol misuse include anxiety, stigma or labeling, and interference with the clinician-patient relationship. Although evidence is very limited, no direct harms were identified for any population in available studies.

*Current Practice*

Research suggests that although most pediatricians and family practice clinicians report providing some alcohol prevention services to adolescent patients, they do not universally or consistently screen and counsel for alcohol misuse. Barriers to screening and counseling include a perceived lack of time, familiarity with screening tools, training in managing positive results, and available treatment resources.

Useful Resources

The AUDIT and AUDIT-C screening instruments for alcohol misuse are available from the Substance Abuse and Mental Health Services Administration–Health Resources and Services Administration Center for Integrated Health Solutions. Further details about the single-question screening method, as well as resources on primary care–feasible behavioral interventions, are available from the NIAAA.

The Community Preventive Services Task Force recommends electronic screening and brief intervention to reduce excessive alcohol consumption. Electronic screening and brief intervention uses electronic devices (for example, computers, telephones, or mobile devices) to facilitate screening persons for excessive drinking and delivering a brief intervention, which provides personalized feedback about the risks and consequences of excessive drinking. Delivery of personalized feedback can range from being fully automated (computer-based) to interactive (provided by a person over the telephone). At least 1 part of the brief intervention must be delivered by an electronic device. Electronic screening and brief intervention can be delivered in various settings, such as health care systems, universities, or communities. The Community Preventive Services Task Force found limited information on the effectiveness of electronic screening and brief intervention among adolescents.

The Community Preventive Services Task Force has also evaluated public health interventions (those that occur outside of the clinical practice setting) to prevent excessive alcohol consumption. It recommends instituting liability laws for establishments that sell or serve alcohol, increasing taxes on alcohol, maintaining limits on days and hours of the sale of alcohol, and regulating alcohol outlet density in communities as effective in preventing or reducing alcohol-related harms. It also recommends enhanced enforcement of laws prohibiting the sale of alcohol to minors. More information about the Community Preventive Services Task Force's recommendations on alcohol misuse is available at www.thecommunityguide.org/alcohol/index.html.

The Cochrane Collaboration has performed 2 systematic reviews to evaluate the effects of universal school- and family-based prevention programs to prevent or reduce alcohol misuse in young people. Although not entirely consistent across studies, evidence generally supported the effectiveness of certain school-based psychosocial and developmental programs, such as the Life Skills Training Program, the Unplugged Program, and the Good Behavior Game. Similarly, evidence generally supported small but positive effects from family-based interventions in preventing alcohol misuse in young people.

The USPSTF has made recommendations on screening for and interventions to decrease the unhealthy use of other substances, including illicit drugs and tobacco. More information is at http://www.uspreventiveservicestaskforce.org/.

Definitions:

What the U.S. Preventive Services Task Force (USPSTF) Grades Mean and Suggestions for Practice

| Grade | Grade Definitions | Suggestions for Practice |
|---|---|---|
| A | The USPSTF recommends the service. There is high certainty that the net benefit is substantial. | Offer or provide this service. |
| B | The USPSTF recommends the service. There is high certainty that the net benefit is moderate or there is moderate certainty that the net benefit is moderate to substantial. | Offer or provide this service. |
| C | The USPSTF recommends selectively offering or providing this service to individual patients based on professional judgment and patient preferences. There is at least moderate certainty that the net benefit is small. | Offer or provide this service only if other considerations support offering or providing the service in an individual patient. |
| D | The USPSTF recommends against the service. There is moderate or high certainty that the service has no net benefit or that the harms outweigh the benefits. | Discourage the use of this service. |
| I Statement | The USPSTF concludes that the current evidence is insufficient to assess the balance of benefits and harms of the service. Evidence is lacking, of poor quality, or conflicting, and the | Read "Clinical Considerations" section of USPSTF Recommendation Statement (see the "Major Recommendations" field). If the service is offered, patients |

| Grade | Grade Definitions | Suggestions for Practice |
| --- | --- | --- |
| | balance of benefits and harms cannot be measured. | should understand the uncertainty about the balance of benefits and harms. |

USPSTF Levels of Certainty Regarding Net Benefit

Definition: The USPSTF defines *certainty* as "likelihood that the USPSTF assessment of the net benefit of a preventive service is correct." The net benefit is defined as benefit minus harm of the preventive service as implemented in a general, primary care population. The USPSTF assigns a certainty level based on the nature of the overall evidence available to assess the net benefit of a preventive service.

| Level of Certainty | Description |
| --- | --- |
| High | The available evidence usually includes consistent results from well-designed, well-conducted studies in representative primary care populations. These studies assess the effects of the preventive service on health outcomes. This conclusion is therefore unlikely to be strongly affected by the results of future studies. |
| Moderate | The available evidence is sufficient to determine the effects of the preventive service on health outcomes, but confidence in the estimate is constrained by factors such as:<br>• The number, size, or quality of individual studies<br>• Inconsistency of findings across individual studies<br>• Limited generalizability of findings to routine primary care practice; and<br>• Lack of coherence in the chain of evidence<br>As more information becomes available, the magnitude or direction of the observed effect could change, and this change may be large enough to alter the conclusion. |
| Low | The available evidence is insufficient to assess effects on health outcomes. Evidence is insufficient because of:<br>• The limited number or size of studies<br>• Important flaws in study design or methods<br>• Inconsistency of findings across individual studies<br>• Gaps in the chain of evidence<br>• Findings not generalizable to routine primary care practice; and<br>• A lack of information on important health outcomes<br>More information may allow an estimation of effects on health outcomes. |

## Clinical Algorithm(s)

None provided

# Scope

## Disease/Condition(s)

Alcohol misuse

## Guideline Category

Counseling

Prevention

Screening

## Clinical Specialty

Family Practice

Internal Medicine

Pediatrics

Preventive Medicine

Psychology

## Intended Users

Advanced Practice Nurses

Allied Health Personnel

Nurses

Physician Assistants

Physicians

Psychologists/Non-physician Behavioral Health Clinicians

## Guideline Objective(s)

- To review evidence on the effectiveness of screening and behavioral counseling interventions in primary care to reduce alcohol misuse
- To update the 2004 U.S. Preventive Services Task Force (USPSTF) recommendation statement on screening and behavioral counseling interventions in primary care to reduce alcohol misuse

## Target Population

Adolescents aged 12 to 17 years and adults aged 18 years or older

Note: These recommendations do not apply to persons who are actively seeking evaluation or treatment of alcohol misuse.

## Interventions and Practices Considered

1. Screening for alcohol misuse using the following tools:
    - Alcohol Use Disorders Identification Test (AUDIT)
    - Abbreviated AUDIT-Consumption Test (AUDIT-C)
    - Single-question screening
2. Behavioral counseling (face-to-face, computer/Web-based, or telephone counseling)
3. Patient education

## Major Outcomes Considered

Key Question 1: What is the direct evidence that screening for alcohol misuse followed by a behavioral counseling intervention, with or without referral, leads to reduced morbidity, reduced mortality, or changes in other long-term (6 months or longer) outcomes (e.g., health care utilization, sick days, costs, legal issues, employment stability)?

Key Question 2: How do specific screening modalities compare with one another for detecting alcohol misuse?

Key Question 3: What adverse effects are associated with screening for alcohol misuse and screening-related assessment?

Key Question 4a: How do behavioral counseling interventions, with or without referral, compare with usual care for improving intermediate

outcomes (e.g., change in mean number of drinks per drinking day or heavy drinking episodes) for people with alcohol misuse as identified by screening?

Key Question 4b: How do specific behavioral counseling approaches, with or without referral, compare with one another for improving intermediate outcomes for people with alcohol misuse as identified by screening?

Key Question 5: What adverse effects are associated with behavioral counseling interventions, with or without referral, for people with alcohol misuse as identified by screening?

Key Question 6: How do behavioral counseling interventions, with or without referral, compare with one another and with usual care for reducing morbidity, reducing mortality, or changing other long-term (6 months or longer) outcomes (e.g., health care utilization, sick days, costs, legal issues, employment stability) for people with alcohol misuse as identified by screening?

Key Question 7: To what extent do health care system influences promote or hinder effective screening and interventions for alcohol misuse?

# Methodology

## Methods Used to Collect/Select the Evidence

Hand-searches of Published Literature (Primary Sources)

Hand-searches of Published Literature (Secondary Sources)

Searches of Electronic Databases

## Description of Methods Used to Collect/Select the Evidence

Note from the National Guideline Clearinghouse (NGC): A systematic evidence review was prepared by RTI International and the University of North Carolina at Chapel Hill for the U.S. Preventive Services Task Force (USPSTF) (see the "Availability of Companion Documents" field).

Data Sources and Searches

The reviewers searched MEDLINE, EMBASE, the Cochrane Library, CINAHL, PsycINFO, and the International Pharmaceutical Abstracts from 1 January 1985 to 31 January 2012, limited to English-language articles. The start date was selected on the basis of the earliest publication date found in previous reviews and expert opinion. The reviewers used Medical Subject Headings as search terms when available and key words when appropriate, focusing on terms to describe relevant populations, screening, and behavioral interventions.

Study Selection

The reviewers developed inclusion and exclusion criteria with respect to populations, interventions, comparators, outcomes, timing, settings, and study designs. For the question related to behavioral interventions, the reviewers included randomized, controlled trials at least 6 month in duration, that enrolled adults or adolescents with alcohol misuse identified by screening in primary care settings, and that evaluated whether a counseling intervention improved behavioral or health outcomes.

Two investigators independently reviewed titles and abstracts, and then another 2 investigators independently reviewed the full text of all articles marked for possible inclusion during the initial review to determine final inclusion or exclusion. Disagreements were resolved with an experienced team member.

## Number of Source Documents

- 38 articles were included in the qualitative synthesis.
- 19 trials were included in the quantitative synthesis.

## Methods Used to Assess the Quality and Strength of the Evidence

Expert Consensus

Weighting According to a Rating Scheme (Scheme Given)

## Rating Scheme for the Strength of the Evidence

Definitions of Grade of Overall Strength of Evidence

| Grade | Definition |
|---|---|
| High | High confidence that the evidence reflects the true effect. Further research is very unlikely to change confidence in the estimate of effect. |
| Moderate | Moderate confidence that the evidence reflects the true effect. Further research may change confidence in the estimate of effect and may change the estimate. |
| Low | Low confidence that the evidence reflects the true effect. Further research is likely to change confidence in the estimate of effect and is likely to change the estimate. |
| Insufficient | Either evidence is unavailable or does not permit estimation of an effect. |

## Methods Used to Analyze the Evidence

Meta-Analysis of Randomized Controlled Trials

Review of Published Meta-Analyses

Systematic Review with Evidence Tables

## Description of the Methods Used to Analyze the Evidence

Note from the National Guideline Clearinghouse (NGC): A systematic evidence review was prepared by RTI International and the University of North Carolina at Chapel Hill for the U.S. Preventive Services Task Force (USPSTF) (see the "Availability of Companion Documents" field).

Data Extraction and Quality Assessment

The reviewers designed and used structured forms to extract pertinent information from each article, including information about the methods and populations, interventions, comparators, outcomes, timing, settings, and study designs. All data extractions were reviewed for completeness and accuracy by a second team member.

The team assessed the quality (internal validity) of studies using predefined criteria based on those developed by the USPSTF (ratings of good, fair, or poor) and the University of York Centre for Reviews and Dissemination. These included assessment of the adequacy of randomization, allocation concealment, similarity of groups at baseline, masking, attrition, and whether intention-to-treat analysis was used. Two independent reviewers assigned quality ratings for each study. Disagreements were resolved by an experienced member of the team.

Data Synthesis and Analysis

The team stratified evidence by population (adults, older adults, young adults or college students, and pregnant women). Quantitative analyses were conducted of outcomes reported by a sufficient number of studies that were homogeneous enough to justify combining their results. The team used random-effects models. For the outcome of alcohol consumption, the effect measure was mean difference between the intervention and control groups for change from baseline in drinks per week. The percentages of patients who had episodes of heavy drinking and those who achieved recommended drinking limits were compared (between intervention and control groups) with a risk difference. Because follow-up periods varied, the analysis for all-cause mortality was based on deaths per person-year and the comparison between intervention and control groups was calculated as a risk ratio. Analyses were conducted by using Comprehensive Meta-Analysis, version 2.2.055 (Bio-Stat, Englewood, New Jersey).

The reviewers used subgroup analyses to explore whether results differed by intensity, sex, country, deliverer of the intervention, or setting. The chi-square and $I^2$ statistics were calculated to assess heterogeneity in effects between studies. When quantitative analyses were not appropriate

(for example, because of heterogeneity, insufficient number of similar studies, or insufficient or varied outcome reporting), the team synthesized the data qualitatively.

To assess the differential effects of using more or less time and single or multiple contacts, the team grouped interventions by intensity of counseling, as measured by the duration and number of contacts: very brief (5 minutes, single-contact), brief (6 to 15 minutes, single-contact), extended (15 minutes, single-contact), brief multicontact (each contact 15 minutes), or extended multicontact some contacts 15 minutes).

The team then graded the strength of evidence (SOE) as high, moderate, low, or insufficient on the basis of the guidance established for the Evidence-based Practice Center Program (see Appendix Table 2 in the systematic review, available at www.annals.org [see the "Availability of Companion Documents" field]). Two reviewers assessed each domain for each key outcome, and differences were resolved by consensus.

## Methods Used to Formulate the Recommendations

Balance Sheets

Expert Consensus

## Description of Methods Used to Formulate the Recommendations

The U.S. Preventive Services Task Force (USPSTF) systematically reviews the evidence concerning both the benefits and harms of widespread implementation of a preventive service. It then assesses the certainty of the evidence and the magnitude of the benefits and harms. On the basis of this assessment, the USPSTF assigns a letter grade to each preventive service signifying its recommendation about provision of the service (see Table below). An important, but often challenging, step is determining the balance between benefits and harms to estimate "net benefit" (that is, benefits minus harms).

Table 1. U.S. Preventive Services Task Force Recommendation Grid*

| **Certainty of Net Benefit** | **Magnitude of Net Benefit** | | | |
|---|---|---|---|---|
| | **Substantial** | **Moderate** | **Small** | **Zero/Negative** |
| High | A | B | C | D |
| Moderate | B | B | C | D |
| Low | Insufficient | | | |

**A, B, C, D,* and *I (Insufficient)* represent the letter grades of recommendation or statement of insufficient evidence assigned by the U.S. Preventive Services Task Force after assessing certainty and magnitude of net benefit of the service (see the "Rating Scheme for the Strength of the Recommendations" field).

The overarching question that the Task Force seeks to answer for every preventive service is whether evidence suggests that provision of the service would improve health outcomes if implemented in a general primary care population. For screening topics, this standard could be met by a large randomized, controlled trial (RCT) in a representative asymptomatic population with follow-up of all members of both the group "invited for screening" and the group "not invited for screening."

Direct RCT evidence about screening is often unavailable, so the Task Force considers indirect evidence. To guide its selection of indirect evidence, the Task Force constructs a "chain of evidence" within an analytic framework. For each key question, the body of pertinent literature is critically appraised, focusing on the following 6 questions:

1. Do the studies have the appropriate research design to answer the key question(s)?
2. To what extent are the existing studies of high quality? (i.e., what is the internal validity?)
3. To what extent are the results of the studies generalizable to the general U.S. primary care population and situation? (i.e., what is the external validity?)
4. How many studies have been conducted that address the key question(s)? How large are the studies? (i.e., what is the precision of the evidence?)
5. How consistent are the results of the studies?

6. Are there additional factors that assist the USPSTF in drawing conclusions (e.g., presence or absence of dose–response effects, fit within a biologic model)?

The next step in the Task Force process is to use the evidence from the key questions to assess whether there would be net benefit if the service were implemented. In 2001, the USPSTF published an article that documented its systematic processes of evidence evaluation and recommendation development. At that time, the Task Force's overall assessment of evidence was described as good, fair, or poor. The Task Force realized that this rating seemed to apply only to how well studies were conducted and did not fully capture all of the issues that go into an overall assessment of the evidence about net benefit. To avoid confusion, the Task Force has changed its terminology. Whereas individual study quality will continue to be characterized as good, fair, or poor, the term certainty will now be used to describe the Task Force's assessment of the overall body of evidence about net benefit of a preventive service and the likelihood that the assessment is correct. Certainty will be determined by considering all 6 questions listed above; the judgment about certainty will be described as high, moderate, or low.

In making its assessment of certainty about net benefit, the evaluation of the evidence from each key question plays a primary role. It is important to note that the Task Force makes recommendations for real-world medical practice in the United States and must determine to what extent the evidence for each key question—even evidence from screening RCTs or treatment RCTs—can be applied to the general primary care population. Frequently, studies are conducted in highly selected populations under special conditions. The Task Force must consider differences between the general primary care population and the populations studied in RCTs and make judgments about the likelihood of observing the same effect in actual practice.

It is also important to note that one of the key questions in the analytic framework refers to the potential harms of the preventive service. The Task Force considers the evidence about the benefits and harms of preventive services separately and equally. Data about harms are often obtained from observational studies because harms observed in RCTs may not be representative of those found in usual practice and because some harms are not completely measured and reported in RCTs.

Putting the body of evidence for all key questions together as a chain, the Task Force assesses the certainty of net benefit of a preventive service by asking the 6 major questions listed above. The Task Force would rate a body of convincing evidence about the benefits of a service that, for example, derives from several RCTs of screening in which the estimate of benefits can be generalized to the general primary care population as "high" certainty (see the "Rating Scheme for the Strength of Recommendations" field). The Task Force would rate a body of evidence that was not clearly applicable to general practice or has other defects in quality, research design, or consistency of studies as "moderate" certainty. Certainty is "low" when, for example, there are gaps in the evidence linking parts of the analytic framework, when evidence to determine the harms of treatment is unavailable, or when evidence about the benefits of treatment is insufficient. Table 4 in the methodology document listed below (see the "Availability of Companion Documents" field) summarizes the current terminology used by the Task Force to describe the critical assessment of evidence at all 3 levels: individual studies, key questions, and overall certainty of net benefit of the preventive service.

Sawaya GF et al. Update on the methods of the U.S. Preventive Services Task Force: estimating certainty and magnitude of net benefit. Ann Intern Med. 2007;147:871-875.[5 references].

I Statements

For I statements, the USPSTF has a new plan to commission its Evidence-based Practice Centers to collect information in 4 domains pertinent to clinical decisions about prevention and to report this information routinely. This plan is described in the paper: Petitti DB et al. Update on the methods of the U.S. Preventive Services Task Force: insufficient evidence. Ann Intern Med. 2009;150:199-205. http://annals.org/article.aspx?articleid=744255

The first domain is potential preventable burden of suffering from the condition. When evidence is insufficient, provision of an intervention designed to prevent a serious condition (such as dementia) might be viewed more favorably than provision of a service designed to prevent a condition that does not cause as much suffering (such as rash). The USPSTF recognized that "burden of suffering" is subjective and involves judgment. In clinical settings, it should be informed by patient values and concerns.

The second domain is potential harm of the intervention. When evidence is insufficient, an intervention with a large potential for harm (such as major surgery) might be viewed less favorably than an intervention with a small potential for harm (such as advice to watch less television). The USPSTF again acknowledges the subjective nature and the difficulty of assessing potential harms: for example, how bad is a "mild" stroke?

The third domain is cost—not just monetary cost, but opportunity cost, in particular the amount of time a provider spends to provide the service, the amount of time the patient spends to partake of it, and the benefits that might derive from alternative uses of the time or money for patients, clinicians, or systems. Consideration of clinician time is especially important for preventive services with only insufficient evidence because providing them could "crowd out" provision of preventive services with proven value, services for conditions that require immediate action, or services more desired by the patient. For example, a decision to routinely inspect the skin could take up the time available to discuss smoking

cessation, or to address an acute problem or a minor injury that the patient considers important.

The fourth domain is current practice. This domain was chosen because it is important to clinicians for at least 2 reasons. Clinicians justifiably fear that not doing something that is done on a widespread basis in the community may lead to litigation. More important, addressing patient expectations is a crucial part of the clinician–patient relationship in terms of building trust and developing a collaborative therapeutic relationship. The consequences of not providing a service that is neither widely available nor widely used are less serious than not providing a service accepted by the medical profession and thus expected by patients. Furthermore, ingrained care practices are difficult to change, and efforts should preferentially be directed to changing those practices for which the evidence to support change is compelling.

Although the reviewers did not explicitly recognize it when these domains were chosen, the domains all involve consideration of the potential consequences—for patients, clinicians, and systems—of providing or not providing a service. Others writing about medical decision making in the face of uncertainty have suggested that the consequences of action or inaction should play a prominent role in decisions.

## Rating Scheme for the Strength of the Recommendations

What the U.S. Preventive Services Task Force (USPSTF) Grades Mean and Suggestions for Practice

| Grade | Grade Definitions | Suggestions for Practice |
|---|---|---|
| A | The USPSTF recommends the service. There is high certainty that the net benefit is substantial. | Offer or provide this service. |
| B | The USPSTF recommends the service. There is high certainty that the net benefit is moderate or there is moderate certainty that the net benefit is moderate to substantial. | Offer or provide this service. |
| C | The USPSTF recommends selectively offering or providing this service to individual patients based on professional judgment and patient preferences. There is at least moderate certainty that the net benefit is small. | Offer or provide this service only if other considerations support offering or providing the service in an individual patient. |
| D | The USPSTF recommends against the service. There is moderate or high certainty that the service has no net benefit or that the harms outweigh the benefits. | Discourage the use of this service. |
| I Statement | The USPSTF concludes that the current evidence is insufficient to assess the balance of benefits and harms of the service. Evidence is lacking, of poor quality, or conflicting, and the balance of benefits and harms cannot be measured. | Read "Clinical Considerations" section of USPSTF Recommendation Statement (see the "Major Recommendations" field). If the service is offered, patients should understand the uncertainty about the balance of benefits and harms. |

USPSTF Levels of Certainty Regarding Net Benefit

Definition: The USPSTF defines certainty as "likelihood that the USPSTF assessment of the net benefit of a preventive service is correct." The net benefit is defined as benefit minus harm of the preventive service as implemented in a general, primary care population. The USPSTF assigns a certainty level based on the nature of the overall evidence available to assess the net benefit of a preventive service.

| Level of Certainty | Description |
|---|---|
| High | The available evidence usually includes consistent results from well-designed, well-conducted studies in representative primary care populations. These studies assess the effects of the preventive service on health outcomes. This conclusion is therefore unlikely to be strongly affected by the results of future studies. |
| Moderate | The available evidence is sufficient to determine the effects of the preventive service on health outcomes, but confidence in the estimate is constrained by factors such as:<br>• The number, size, or quality of individual studies<br>• Inconsistency of findings across individual studies<br>• Limited generalizability of findings to routine primary care practice; and<br>• Lack of coherence in the chain of evidence<br>As more information becomes available, the magnitude or direction of the observed effect could change, and this change may be |

| Level of Certainty | Description |
| --- | --- |
| | large enough to alter the conclusion. |
| Low | The available evidence is insufficient to assess effects on health outcomes. Evidence is insufficient because of: |
| | • The limited number or size of studies<br>• Important flaws in study design or methods<br>• Inconsistency of findings across individual studies<br>• Gaps in the chain of evidence<br>• Findings not generalizable to routine primary care practice; and<br>• A lack of information on important health outcomes<br><br>More information may allow an estimation of effects on health outcomes. |

## Cost Analysis

The guideline developers reviewed published cost analyses.

## Method of Guideline Validation

Comparison with Guidelines from Other Groups

External Peer Review

Internal Peer Review

## Description of Method of Guideline Validation

Peer Review. Before the U.S. Preventive Services Task Force (USPSTF) makes its final determinations about recommendations on a given preventive service, the Evidence-based Practice Center and the Agency for Healthcare Research and Quality send a draft evidence review to 4 to 6 external experts and to Federal agencies and professional and disease-based health organizations with interests in the topic. The experts are asked to examine the review critically for accuracy and completeness and to respond to a series of specific questions about the document. After assembling these external review comments and documenting the proposed response to key comments, the topic team presents this information to the USPSTF in memo form. In this way, the USPSTF can consider these external comments before it votes on its recommendations about the service. Draft recommendation statements are then circulated for comment among reviewers representing professional societies, voluntary organizations, and Federal agencies, as well as posted on the Task Force Web site for public comment. These comments are discussed before the final recommendations are confirmed.

Response to Public Comment. A draft version of this recommendation statement was posted on the USPSTF Web site from 24 September 2012 to 22 October 2012. Several comments indicated that the USPSTF should more clearly emphasize the need for more research on screening and counseling interventions for alcohol misuse in the adolescent population; this was added to the Research Needs and Gaps section in the original guideline. Some comments requested the inclusion of recommended screening instruments; links to these tools were added to the Useful Resources section in the original guideline. Several comments indicated that there was insufficient explanation of the distinctions between risky drinking and alcohol dependence, as well as what constitutes "binge" drinking or a "drink"; expanded definitions and examples were added to the Rationale and Discussion sections in the original guideline.

Comparison with Guidelines from Other Groups. Recommendations for screening from the following groups were discussed: the American Society of Addiction Medicine, the National Institute on Alcohol Abuse and Alcoholism, the American College of Obstetricians and Gynecologists, and the American Academy of Pediatrics.

# Evidence Supporting the Recommendations

## Type of Evidence Supporting the Recommendations

The type of supporting evidence is not specifically stated for each recommendation.

# Benefits/Harms of Implementing the Guideline Recommendations

## Potential Benefits

Benefits of Detection and Behavioral Counseling Interventions

- The U.S. Preventive Services Task Force (USPSTF) found adequate evidence that brief behavioral counseling interventions are effective in reducing heavy drinking episodes in adults engaging in risky or hazardous drinking. These interventions also reduce weekly alcohol consumption rates and increase adherence to recommended drinking limits. Direct evidence about the effectiveness of brief behavioral counseling interventions in pregnant women engaging in alcohol use is more limited. However, studies in the general adult population show that such interventions reduce alcohol consumption and increase adherence to recommended drinking limits among women of childbearing age.
- The USPSTF found insufficient evidence on the effect of screening for alcohol misuse and brief behavioral counseling interventions on outcomes in adolescents.

## Potential Harms

- There are minimal data to assess the magnitude of harms of screening for alcohol misuse or of consequent brief behavioral counseling interventions in any population. However, no studies have identified direct evidence of harms. Thus, given the noninvasive nature of the screening process and behavioral counseling interventions, the related harms are probably small to none.
- Potential harms associated with screening adolescents for alcohol misuse include anxiety, stigma or labeling, and interference with the clinician–patient relationship. Although evidence is very limited, no direct harms were identified for any population in available studies.

# Qualifying Statements

## Qualifying Statements

- The U.S. Preventive Services Task Force (USPSTF) makes recommendations about the effectiveness of specific clinical preventive services for patients without related signs or symptoms.
- It bases its recommendations on the evidence of both the benefits and harms of the service and an assessment of the balance. The USPSTF does not consider the costs of providing a service in this assessment.
- The USPSTF recognizes that clinical decisions involve more considerations than evidence alone. Clinicians should understand the evidence but individualize decision making to the specific patient or situation. Similarly, the USPSTF notes that policy and coverage decisions involve considerations in addition to the evidence of clinical benefits and harms.
- Recommendations made by the USPSTF are independent of the U.S. government. They should not be construed as an official position of the Agency for Healthcare Research and Quality or the U.S. Department of Health and Human Services.

# Implementation of the Guideline

## Description of Implementation Strategy

The experiences of the first and second U.S. Preventive Services Task Force (USPSTF), as well as that of other evidence-based guideline efforts, have highlighted the importance of identifying effective ways to implement clinical recommendations. Practice guidelines are relatively weak tools for changing clinical practice when used in isolation. To effect change, guidelines must be coupled with strategies to improve their acceptance and feasibility. Such strategies include enlisting the support of local opinion leaders, using reminder systems for clinicians and patients, adopting standing orders, and audit and feedback of information to clinicians about their compliance with recommended practice.

In the case of preventive services guidelines, implementation needs to go beyond traditional dissemination and promotion efforts to recognize the added patient and clinician barriers that affect preventive care. These include clinicians' ambivalence about whether preventive medicine is part of their job, the psychological and practical challenges that patients face in changing behaviors, lack of access to health care or of insurance coverage

for preventive services for some patients, competing pressures within the context of shorter office visits, and the lack of organized systems in most practices to ensure the delivery of recommended preventive care.

Dissemination strategies have changed dramatically in this age of electronic information. While recognizing the continuing value of journals and other print formats for dissemination, the USPSTF Task Force will make all its products available through its Web site . The combination of electronic access and extensive material in the public domain should make it easier for a broad audience of users to access USPSTF materials and adapt them for their local needs. Online access to USPSTF products also opens up new possibilities for the appearance of the annual, pocket-size Guide to Clinical Preventive Services.

To be successful, approaches for implementing prevention have to be tailored to the local level and deal with the specific barriers at a given site, typically requiring the redesign of systems of care. Such a systems approach to prevention has had notable success in established staff-model health maintenance organizations, by addressing organization of care, emphasizing a philosophy of prevention, and altering the training and incentives for clinicians. Staff-model plans also benefit from integrated information systems that can track the use of needed services and generate automatic reminders aimed at patients and clinicians, some of the most consistently successful interventions. Information systems remain a major challenge for individual clinicians' offices, however, as well as for looser affiliations of practices in network-model managed care and independent practice associations, where data on patient visits, referrals, and test results are not always centralized.

### Implementation Tools

Foreign Language Translations

Mobile Device Resources

Patient Resources

Pocket Guide/Reference Cards

Staff Training/Competency Material

For information about availability, see the *Availability of Companion Documents* and *Patient Resources* fields below.

## Institute of Medicine (IOM) National Healthcare Quality Report Categories

### IOM Care Need

Getting Better

Staying Healthy

### IOM Domain

Effectiveness

Patient-centeredness

## Identifying Information and Availability

### Bibliographic Source(s)

U.S. Preventive Services Task Force (USPSTF). Screening and behavioral counseling interventions in primary care to reduce alcohol misuse:

U.S. Preventive Services Task Force recommendation statement. Ann Intern Med. 2013 Aug 6;159(3):210-8. [35 references] PubMed

## Adaptation

Not applicable: The guideline was not adapted from another source.

## Date Released

1989 (revised 2013 May 14)

## Guideline Developer(s)

U.S. Preventive Services Task Force - Independent Expert Panel

## Guideline Developer Comment

The U.S. Preventive Services Task Force (USPSTF) is a federally-appointed panel of independent experts. Conclusions of the USPSTF do not necessarily reflect policy of the U.S. Department of Health and Human Services (DHHS) or its agencies.

## Source(s) of Funding

The U.S. Preventive Services Task Force (USPSTF) is an independent, voluntary body. The U.S. Congress mandates that the Agency for Healthcare Research and Quality support the operations of the USPSTF.

## Guideline Committee

U.S. Preventive Services Task Force (USPSTF)

## Composition of Group That Authored the Guideline

*Task Force Members**: Virginia A. Moyer, MD, MPH (*Chair*) (American Board of Pediatrics, Chapel Hill, North Carolina); Michael L. LeFevre, MD, MSPH (*Co-Vice Chair*) (University of Missouri School of Medicine, Columbia, Missouri); Albert L. Siu, MD, MSPH (*Co-Vice Chair*) (Mount Sinai School of Medicine, New York, and James J. Peters Veterans Affairs Medical Center, Bronx, New York); Linda Ciofu Baumann, PhD, RN (University of Wisconsin, Madison, Wisconsin); Kirsten Bibbins-Domingo, PhD, MD (University of California, San Francisco, San Francisco, California); Susan J. Curry, PhD (University of Iowa College of Public Health, Iowa City, Iowa); Mark Ebell, MD, MS (University of Georgia, Athens, Georgia); Glenn Flores, MD (University of Texas Southwestern, Dallas, Texas); Francisco A.R. GarcÄ±a, MD, MPH (Pima County Department of Health, Tucson, Arizona); Adelita Gonzales Cantu, RN, PhD (University of Texas Health Science Center, San Antonio, Texas); David C. Grossman, MD, MPH (Group Health Cooperative, Seattle, Washington); Jessica Herzstein, MD, MPH (Air Products, Allentown, Pennsylvania); Wanda K. Nicholson, MD, MPH, MBA (University of North Carolina School of Medicine, Chapel Hill, North Carolina); Douglas K. Owens, MD, MS (Veteran Affairs Palo Alto Health Care System, Palo Alto, and Stanford University, Stanford, California); William R. Phillips, MD, MPH (University of Washington, Seattle, Washington); and Michael P. Pignone, MD, MPH (University of North Carolina, Chapel Hill, North Carolina). Joy Melnikow, MD, MPH, a former USPSTF member, also contributed to the development of this recommendation.

**Members of the USPSTF at the time this recommendation was finalized. For a list of current Task Force members, go to http://www.uspreventiveservicestaskforce.org/Page/Name/our-members*.

## Financial Disclosures/Conflicts of Interest

The U.S. Preventive Services Task Force (USPSTF) has an explicit policy concerning conflict of interest. All members disclose at each meeting if

they have a significant financial, professional/business, or intellectual conflict for each topic being discussed. USPSTF members with conflicts may be recused from discussing or voting on recommendations about the topic in question.

Potential Conflicts of Interest: None disclosed. Disclosure forms from USPSTF members can be viewed at https://www.acponline.org/authors/icmje/ConflictOfInterestForms.do?msNum=M13-1537.

## Guideline Status

This is the current release of the guideline.

This guideline updates a previous version: Screening and behavioral counseling interventions in primary care to reduce alcohol misuse: recommendation statement. Ann Intern Med. 2004 Apr 6;140(7):554-6.

## Guideline Availability

Electronic copies: Available from the Annals of Internal Medicine Web site.

## Availability of Companion Documents

The following are available:

Evidence Reviews:

- Jonas DE, Garbutt JC, Amick HR, Brown JM, Brownley KA, Council CL, Viera AJ, Wilkins TM, Schwartz CJ, Richmond EM, Yeatts J, Evans TS, Wood SD, Harris RP. Behavioral counseling after screening for alcohol misuse in primary care: a systematic review and meta-analysis for the U.S. Preventive Services Task Force. Ann Intern Med. 2012 Nov 6;157(9):645-54.
- Jonas DE, Garbutt JC, Brown JM, Amick HR, Brownley KA, Council CL, Viera AJ, Wilkins TM, Schwartz CJ, Richmond ER, Yeatts J, Swinson Evans T, Wood SD, Harris RP. Screening, behavioral counseling, and referral in primary care to reduce alcohol misuse. Comparative Effectiveness Review No. 64. AHRQ Publication No. 12-EHC055-EF. Rockville (MD): Agency for Healthcare Research and Quality; 2012 Jul. 382 p.

Electronic copies: Available from the U.S. Preventive Services Task Force (USPSTF) Web site.

Background Articles:

- Barton MB et al. How to read the new recommendation statement: methods update from the U.S. Preventive Services Task Force. Ann Intern Med 2007;147:123-127.
- Guirguis-Blake J et al. Current processes of the U.S. Preventive Services Task Force: refining evidence-based recommendation development. Ann Intern Med 2007;147:117-122.
- Sawaya GF et al. Update on the methods of the U.S. Preventive Services Task Force: estimating certainty and magnitude of net benefit. Ann Intern Med 2007;147:871-875.
- Petitti DB et al. Update on the methods of the U.S. Preventive Services Task Force: insufficient evidence. Ann Intern Med. 2009;150:199-205.

Electronic copies: Available from the USPSTF Web site.

The following are also available:

- The guide to clinical preventive services, 2012. Recommendations of the U.S. Preventive Services Task Force. Rockville (MD): Agency for Healthcare Research and Quality (AHRQ), 2012. 128 p. Electronic copies available from the AHRQ Web site. See the related QualityTool summary on the Health Care Innovations Exchange Web site.
- Screening and behavioral counseling interventions in primary care to reduce alcohol misuse. Clinical summary of U.S. Preventive Services Task Force recommendation. 2013 Aug. Electronic copies: Available from the USPSTF Web site.
- Screening and behavioral counseling interventions in primary care to reduce alcohol misuse. CME course. Available from the Annals of Internal Medicine Web site.

The Electronic Preventive Services Selector (ePSS) is an application designed to provide primary care clinicians and health care teams timely decision support regarding appropriate screening, counseling, and preventive services for their patients. It is based on the current, evidence-based recommendations of the USPSTF and can be searched by specific patient characteristics, such as age, sex, and selected behavioral risk factors.

## Patient Resources

The following are available:

- Screening and behavioral counseling interventions in primary care to reduce alcohol misuse. Understanding task force recommendations. U.S. Preventive Services Task Force. Consumer fact sheet. 2013 May. 4 p. Electronic copies: Available in Portable Document Format (PDF) from the U.S. Preventive Services Task Force (USPSTF) Web site.
- Screening and behavioral counseling interventions in primary care to reduce alcohol misuse: U.S. Preventive Services Task Force recommendation statement. Summary for patients. 2013 Aug 6;159(3):I-32. Electronic copies: Available from the Annals of Internal Medicine Web site.
- Women: stay healthy at any age. Rockville (MD): Agency for Healthcare Research and Quality. AHRQ Pub. No. 10-IP002-A. 2010 Aug. 2 p. Electronic copies: Available in Portable Document Format (PDF) in English and Spanish from the AHRQ Web site. See the related QualityTool summary on the Health Care Innovations Exchange Web site.
- Men: stay healthy at any age. Rockville (MD): Agency for Healthcare Research and Quality. AHRQ Pub. No. 10-IP004-A. 2010 Aug. 2 p. Electronic copies: Available in PDF in English and Spanish from the AHRQ Web site. See the related QualityTool summary on the Health Care Innovations Exchange Web site.

Print copies: Available in English and Spanish from the Agency for Healthcare Research and Quality (AHRQ) Publications Clearinghouse. For more information, go to http://www.ahrq.gov/news/pubsix.htm or call 1-800-358-9295 (U.S. only).

Myhealthfinder is a new tool that provides personalized recommendations for clinical preventive services specific to the user's age, gender, and pregnancy status. It features evidence-based recommendations from the USPSTF and is available at www.healthfinder.gov.

Please note: This patient information is intended to provide health professionals with information to share with their patients to help them better understand their health and their diagnosed disorders. By providing access to this patient information, it is not the intention of NGC to provide specific medical advice for particular patients. Rather we urge patients and their representatives to review this material and then to consult with a licensed health professional for evaluation of treatment options suitable for them as well as for diagnosis and answers to their personal medical questions. This patient information has been derived and prepared from a guideline for health care professionals included on NGC by the authors or publishers of that original guideline. The patient information is not reviewed by NGC to establish whether or not it accurately reflects the original guideline's content.

## NGC Status

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